

Overview

Greetings! I'm Jimmy and I'm a software developer from California.

I've worked in the software industry for more than a decade, in both web application development and cloud infrastructure management roles. I'm interested in programming languages, security, developer/internal tooling, documentation, and teaching.

I'm the creator of two notable open source projects, Lita (a chat bot framework for Ruby) and Ruma (implementation of the Matrix.org protocol in Rust). I've created and maintained many other small open source projects, primarily in Rust and Ruby.

I'm looking for a position where I can help design and implement large systems and where I can mentor junior developers. I hope to bring wisdom, empathy, and an excitement for learning to any team I work with.

Skills and tools experience

- Programming in multiple languages (roughly in order of experience)
 - Ruby
 - Rust
 - TypeScript
 - JavaScript
 - Python
 - Go
 - Shell
 - Perl
 - Elm
- Cloud infrastructure management, operations, and deployment
 - Amazon Web Services (S3, EC2, EKS, etc.)
 - DigitalOcean
 - Heroku
- Containers and orchestration
 - Docker
 - Kubernetes
 - CoreOS
- Service networking
 - etcd
 - Consul
 - Envoy
- Configuration management

- Chef
 - Puppet
 - Ansible
- Logging, monitoring, and alerting
 - Elasticsearch and Kibana
 - Splunk
 - SignalFx
 - PagerDuty
- Command line proficiency in macOS and Linux
- Databases
 - SQL (PostgreSQL and MySQL)
 - Redis
 - MongoDB
- Web development frameworks
 - Ruby on Rails
 - Axum
 - Flask
- Popular libraries
 - SQLAlchemy
 - RSpec
 - Haml
 - Sass
- Front end web development
 - HTML / CSS
 - JavaScript / TypeScript
 - React
 - Redux / Redux Toolkit
 - Webpack
 - Vite
 - ESLint
- Version control
 - Git
 - GitHub
 - Gerrit
 - Subversion
- Testing
 - TDD/BDD
 - RSpec

- Minitest
- py.test
- nose
- Many test double (mocking) libraries
- Author of Doubles, a test doubles library for Python
- Issue tracking
 - Jira
 - GitHub Issues

Personal Qualities

- Excellent writing and communication skills
- Commitment to quality
- Interested in learning new technologies and concepts
- Strongly values good documentation, both for end users and for internal tools and processes
- Experience in the open source software community

Work History

- Cisco Meraki (2021-2025): Software Engineering Technical Leader
 - Added protections from race conditions to Meraki’s core device configuration code.
 - Led the design and implementation of a system of “mode switching” for new Cisco wireless access points which could operate in either a “Meraki cloud” or “Cisco on-prem” mode.
 - Led the design and implementation of high availability and load balancing for Cisco Campus Gateway, a product for centralized network management at large sites like university campuses.
 - Led the company’s initial adoption of TypeScript, improving the safety and correctness of UI code.
 - Led the design and implementation of a system for encrypting customer secrets at rest.
 - Led the implementation of subscription licensing for wireless device features.
 - Built and maintained internal libraries for error handling.
 - Worked with teams to improve guidelines and practices around working in a large monolithic codebase.
 - Worked with SRE teams to refine deployment and CI/CD workflows.
 - Worked with SRE teams to help adoption of services deployed to Kubernetes.
 - Led a working group tasked with improving the tools and processes for tracking network devices’ capabilities and features for more consistent

- behavior across the system.
 - Made numerous improvements and bug fixes across both front and back end systems.
 - Contributed to incident management, helping diagnose and mitigate critical issues, as well as building long term remediations
- Stripe (2019 — 2020): Infrastructure Engineer
 - Built a data pipeline and dashboard to track adoption of a custom system for limiting the lifespan of EC2 instances.
 - Built a service to improve the observability and reliability of EC2 instance bootstrapping.
 - Enhanced, improved, and maintained internal tools for managing infrastructure.
 - Investigated and remediated infrastructure incidents.
- PagerDuty (2018): Senior Site Reliability Engineer
 - Participated in planning for major technological decisions.
 - Managed configuration of cloud infrastructure.
 - Built a system to monitor critical functionality of HashiCorp Nomad clusters
- InQuicker (2014 — 2017): Senior Developer
 - Development and maintenance of appointment scheduling software for the medical industry.
 - Developed new integrations between the software and popular EMRs.
 - Managed configuration of cloud infrastructure.
 - Built next-generation infrastructure on Kubernetes and tooling for management and application deployment.
- Uber (2013 — 2014): Software Engineer
 - Built a service for preparing driver payout information for display in payment statements.
 - Developed and maintained internal tools.
 - Built and open sourced a test doubles library for Python.
 - Maintained the core internal API powering many services.
 - Improved test suite speed and reliability.
- Change.org (2012 — 2013): Software Engineer
 - Developed new features to generate new streams of revenue.
 - Built comprehensive blackbox test automation.
 - Managed configuration of cloud infrastructure.
 - Built tooling to track and monitor front end performance.
- Eventful (2009 — 2012): Senior Front End Engineer
 - Developed and maintained a website for promoting local events.
 - Built custom skins for advertising campaigns.
 - Built an interactive browser and search portal for concerts and movies.
 - Built a “check in” system for special events.
 - Maintained a system allowing clients to host white-label versions of the site’s event data.
- Einstein Industries (2009): Production Engineer
 - Developed websites for various clients in the legal and medical indus-

tries.

- Miva Merchant (2009): Web Developer
 - Developed custom themes for e-commerce websites and integrated them into proprietary shopping cart software.
- Rady School of Management (2007-2008): Web Developer
 - Developed and maintained a graduate school's website.

Education

Bachelor's degree, University of California, San Diego

References

Available upon request.